

Processing Treatment E

	Time	Temperature	Replenishment Rate
Color Development	90 sec	38° C.	290 ml/m ²
Bleach-Fix	45 sec	35° C.	290 ml/m ²
Water Wash (1)	30 sec	35° C.	
Water Wash (2)	30 sec	35° C.	
Water Wash (3)	30 sec	35° C.	320 ml/m ²

The replenishment of the wash water was carried out by replenishing the water wash bath (3). The overflow from the water wash bath (3) was fed into the water wash bath (2) and the overflow from this bath was supplied to water wash bath (1) to establish a counter-flow replenishment system. At this time the photosensitive material carried over 35 ml/m² of solution from the previous bath and so the replenishment rate was 9.1 times.

[Color Developer]

	Stock Solution	Replenisher
Diethylenetriamine pentaacetic acid	0.5 gram	0.5 gram
1-hydroxyethylidene-1,1-diphosphonic acid	0.5 gram	0.5 gram
Diethylene glycol	8.0 grams	13.0 grams
Benzyl alcohol	12.0 grams	18.5 grams
Sodium bromide	0.7 gram	—
Sodium chloride	0.5 gram	—
Sodium sulfite	2.0 grams	2.5 grams
N,N-Diethylhydroxylamine	3.5 grams	4.5 grams
Triethylenediamine(1,4-diazabicyclo[2,2,2]octane)	3.5 grams	4.5 grams
3-Methyl-4-amino-N-ethyl-N-(β-methanesulfonamidoethyl)aniline	5.5 grams	8.0 grams
Potassium carbonate	30.0 grams	30.0 grams
Fluorescent whitener (stilbene type)	1.0 gram	1.3 grams
Pure water to make	1000 ml	1000 ml
pH	10.50	10.90

The pH was adjusted using potassium hydroxide or hydrochloric acid.

[Bleach-Fix Bath]

	Stock Solution = Replenisher
Ammonium thiosulfate	100 grams
Sodium bisulfite	21.0 grams
Ammonium ethylenediaminetetraacetate ferrate dihydrate	50.0 grams
Ethylenediamine tetraacetic acid disodium salt, dihydrate	5.0 grams
Pure water to make	1000 ml
pH	6.3

The pH was adjusted with aqueous ammonia or hydrochloric acid.

[Wash Water]

Pure water was used (Stock=replenisher)

In this context pure water signifies tap water from which all cations other than hydrogen ions and all anions other than hydroxyl ions had been reduced to concentrations of less than 1 ppm by means of an ion exchange process.

EXAMPLE 9

Example 1 was repeated except that the processing treatment was changed from process A to process F outlined below and similar results to those obtained in example 1 were obtained.

Processing Treatment F

	Time	Temperature	Replenishment Rate
Color Development* ¹	135 sec	36° C.	320 ml/m ²
Bleach-Fix	40 sec	36° C.	320 ml/m ²
Stabilizing (1)* ²	40 sec	36° C.	
Stabilizing (2)* ²	40 sec	36° C.	320 ml/m ²
Drying	40 sec	70° C.	

[Color Developer]

	Stock Solution	Replenisher
Hydroxyethylimino-diacetic acid	0.5 gram	0.5 gram
Monoethylene glycol	9.0 grams	10.0 grams
Benzyl alcohol	9.0 grams	10.0 grams
Monoethanolamine	2.5 grams	2.5 grams
Sodium bromide	2.3 grams	1.5 grams
Sodium chloride	5.5 grams	4.0 grams
N,N-diethylhydroxylamine	5.9 grams	6.5 grams
3-Methyl-4-amino-N-ethyl-N-(β-methanesulfonamidoethyl)aniline	2.7 grams	3.0 grams
3-Methyl-4-amino-N-ethyl-N-hydroxyethylaniline	4.5 grams	5.0 grams
Potassium carbonate	30.0 grams	35.0 grams
Fluorescent whitener (stilbene type)	1.0 gram	1.2 grams
Pure water to make	1000 ml	1000 ml
pH	10.30	10.70

*¹Color developed while exposing to white light of intensity 1 lux for 15 seconds starting from 15 seconds after immersion in the color developer.

*²Stabilizer replenishment with a counter-flow system from stabilizing bath (2) to stabilizing bath (1).

The pH was adjusted using potassium hydroxide or hydrochloric acid.

[Bleach-Fix Bath]

	Stock Solution = Replenisher
Ammonium thiosulfate	110 grams
Sodium bisulfite	12 grams
Ammonium diethylenetriaminepentaacetate ferrate	80 grams
Diethylenetriamine pentaacetic acid	5 grams
2-Mercapto-5-amino-1,3,4-thiadiazole	0.3 gram
Pure water to make	1000 ml
pH	6.80

The pH was adjusted using aqueous ammonia or hydrochloric acid.

[Stabilizer]

	Stock Solution = Replenisher
1-Hydroxyethylidene-1,1-diphosphonic acid	2.7 grams
o-Phenylphenol	0.2 gram
Potassium chloride	2.5 grams
Bismuth chloride	1.0 gram
Zinc chloride	0.25 gram
Sodium sulfite	0.3 gram
Ammonium sulfate	4.5 grams
Fluorescent whitener (stilbene type)	0.5 gram
Pure water to make	1000 ml
pH	7.2